

## **IMPROVED GEOMETRY FOR A SUGAR CANE LOADER BOOM INCLUDING A TOP-SUPPORTED SWIVEL MAST**

### Abstract of the Disclosure

A loader boom of a sugar cane loader includes a swivel mast having a vertical axis located to intersect the mid-point of a furrow located between first and second cane rows that would respectively pass centrally beneath the loader vehicle and outside wheels at one side of the loader vehicle during loading operation. The loader boom includes an inner boom section having a middle portion that extends parallel to the swivel mast axis to a height approximating that of a transporter container to be loaded when the boom is in a fully raised position, and having a lower end portion that is joined to the bottom of, and extends perpendicular to, the middle portion and is pivotally attached to an opposite side of the swivel mast axis from the middle portion. Mounted to the loader is a push piler implement having tines located for operating in a central region of the furrow free of the cane rows.